Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

AMENDMENTS TO THE CLAIMS

The listing of claims presented below will replace all prior versions and listings of claims in the application.

Listing of claims:

1. (withdrawn) An Event Report Request data for requesting to deliver an Event Report data, wherein the Event Report data reports an Event occurred in accordance with use of a digital item, the Event Report Request data comprising Delivery Time information describing time for transmitting the Event Report data,

wherein the Delivery Time information includes:

a specific time;

an elapsed time; and

a periodic time.

2. (withdrawn) The Event Report Request data as recited in claim 1, wherein the specific time includes information requesting to transmit the Event Report data at least one of on a first time, after the first time, before a second time and between the first time and the second time.

3. (withdrawn) The Event Report Request data as recited in claim 2, wherein the elapsed time includes information requesting to transmit the Event Report data at least one of after on, before after a third time, before a fourth time and between the third time and the fourth time.

4.   (withdrawn) The Event Report Request data as recited in claim 1, further

comprising Time information describing time on which the Event occurs,

wherein the Time information includes:

a specific time;

an elapsed time; and

a periodic time.

5.   (withdrawn) The Event Report Request data as recited in claim 4, wherein the

specific time includes information on which the Event occurs at least one of on a first

time, after the first time, before a second time and between the first time and the second

time.

6.   (withdrawn) The Event Report Request data as recited in claim 2, wherein the

elapsed time includes information on which the Event occurs at least one of after on,

before after a third time, before a fourth time and between the third time and the fourth

time.

7.   (withdrawn) The Event Report Request data as recited in claim 1, further

comprising To Whom information,

wherein the To Whom information includes:

a mandatory recipient to whom the Event Report data is transmitted in

mandatory; and

an optional recipient to whom the Event Report data is transmitted in optional.

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

8.   (withdrawn) The Event Report Request data as recited in claim 7, further

comprising:

    Condition Descriptor describing conditions for the delivery of the Event Report

data, i.e., Event condition related to operation for a digital item and Event occurrence

time; and

    ERR Descriptor describing identification and characteristics of the Event Report

Request data.

9.   (withdrawn) The Event Report Request data as recited in claim 8, wherein the

Condition Descriptor includes:

    Time information describing the Event occurrence time;

    DI Related Operation describing user operation condition in accordance with the

use of the digital item; and

    Peer Related Operation describing condition in accordance with the operations

occurred in the peer.

10.   (withdrawn) The Event Report Request data as recited in claim 9, wherein the

ERR Descriptor includes:

    ID describing identification (ID) of the EVENT REPORT REQUEST data;

    Description of the EVENT REPORT REQUEST data describing attributes of the

EVENT REPORT REQUEST data; and

    Access Right describing an access right of the Event Report Request data.

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

11.   (withdrawn) The Event Report Request data as recited in claim 10, wherein the

Description includes:

        Time Stamp describing a time on which the EVENT REPORT REQUEST data is

generated;

        Life Time describing a life time of the EVENT REPORT REQUEST data;

        History describing a history of changes or modification of the EVENT REPORT

REQUEST data; and

        Priority Level describing the priority level of the EVENT REPORT REQUEST

data, wherein the priority level is used by peers to handle Event Report Request data.

12.   (withdrawn) The Event Report Request data as recited in claim 11, further

comprising:

        ER Descriptor describing contents and formats of the Event Report data

corresponding to the Event condition;

        Delivery Descriptor describing generation and transmission schemes of the

Event Report data; and

        To Whom describing a recipient of the Event Report data.

13.   (withdrawn) The Event Report Request data as recited in claim 12, wherein the

ER Descriptor includes:

        ER Data Descriptor describing a report data list and format of the Event Report

data, wherein the report data list is a list of information to be included in the Event

Page 5 of 27

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

Report data; and

ERR describing another Event Report Request data requesting an operation,

e.g., an acknowledgement or forwarding of the Event Report Request data.

14.   (withdrawn) The Event Report Request data as recited in claim 13, wherein the

ER Data Descriptor includes:

ER ID describing identification of the Event Report data; and

Report Data describing a list of information which the Event Report data reports.

15.   (withdrawn) The Event Report Request data as recited in claim 14, wherein the

To Whom includes:

Peer IDs, which is identification information of the peers receiving the Event

Report data; and

User IDs, which is identification information of the users receiving the Event

Report data.

16.   (withdrawn) The Event Report Request data as recited in claim 15, wherein the

Delivery Descriptor includes:

Format describing a format of data used for generating the Event Report data;

Access Right describing access right to the Event Report data;

Encryption describing an encryption algorithm for encrypting the Event Report

data;

Authentication describing an authentication algorithm for authenticating the

Page 6 of 27

Event Report data;

      Delivery Time describing time to delivery the Event Report data;

      Protocol describing a protocol for delivering the Event Report data; and

      Compression describing a compression algorithm for compressing the Event

Report data.

17.   (withdrawn) The Event Report Request data as recited in claim 16, wherein

Report Data includes:

      Peer Data describing information on the peer; and

      User Data describing information on the user.

18.   (withdrawn) The Event Report Request data as recited in claim 7, further

comprising:

      ER Descriptor describing contents and formats of the Event Report data

corresponding to the Event condition; and

      Delivery Descriptor describing generation and transmission schemes of the

Event Report data

19.   (withdrawn) The Event Report Request data as recited in claim 16, wherein the

ER Descriptor includes:

      ER Data Descriptor describing a report data list and format of the Event Report

data, wherein the report data list is a list of information to be included in the Event

Report data; and

ERR describing another Event Report Request data requesting an operation,

e.g., an acknowledgement or forwarding of the Event Report Request data.

20.   (withdrawn) The Event Report Request data as recited in claim 19, wherein the

ER Data Descriptor includes:

ER ID describing identification of an Event Report data;

Access right describing access right to the Event Report data;

Report Data describing list of information which the Event Report data reports;

and

Format describing a format of data used for generating the Event Report data.

21.   (withdrawn) The Event Report Request data as recited in claim 20, wherein the

Delivery Descriptor includes:

To Whom describing a recipient of the Event Report data;

Delivery time describing time to delivery the Event Report data; and

How describing a transmission method of the Event Report data.

22.   (withdrawn) The Event Report Request data as recited in claim 20, wherein the

To Whom includes:

Peer IDs, which is identification information of the peers receiving the Event

Report data; and

User IDs, which is identification information of the users receiving the Event

Report data.

Page 8 of 27

23.' (withdrawn) The Event Report Request data as recited in claim 22, wherein the

How includes:

Compression describing a compression algorithm for compressing the Event

Report data;

Encryption describing an encryption algorithm for encrypting the Event Report

data;

Authentication describing an authentication algorithm for authenticating the Event

Report data; and

Protocol describing a protocol for delivering the Event Report data.

24. (withdrawn) The Event Report Request data as recited in claim 23, wherein the

ERR includes or refers another Event Report Request data requesting an

acknowledgement or forwarding of the Event Report data. ·

25. (withdrawn) The Event Report Request data as recited in claim 24, wherein the

DI Related Operation uses terms of right data dictionary (RDD) defined in MPEG-21.

26. (withdrawn) The Event Report Request data as recited in claim 25, wherein the

Peer Related Operation uses terms of the Peer Environment of a digital item adaptation

(DIA) defined in the MPEG-21.

27. (withdrawn) The Event Report Request data as recited in claim 26, wherein the

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

ID of the ERR Descriptor has the same format as a digital item identification (DII)

defined in the MPEG-21.

28.   (withdrawn) The Event Report Request data as recited in claim 1 or 6, wherein

based on schema of eXtensible Markup Language (XML), syntax of the Delivery time

information is defined as:

```
(Table 1)
<xsd:complexType name="DeliveryTime">
        <xsd:choice minOccurs="0">
                <xsd:element name="specificTime" type="SpecificTime"/>
                <xsd:element name="elapsedTime" type="ElapsedTime"/>
                <xsd:element name="periodicTime" type="PeriodicTime"/>
        </xsd:choice>
</xsd:complexType>
<xsd:complexType name="SpecificTime">
        <xsd:choice>
                <xsd:element name="onTime" type="xsd:dateTime"/>
                <xsd:sequence>
                        <xsd:element name="afterOn" type="xsd:dateTime"
minOccurs="0"/>
                        <xsd:element name="beforeOn" type="xsd:dateTime"
minOccurs="0"/>
                </xsd:sequence>
        </xsd:choice>
</xsd:complexType>
<xsd:complexType name="ElapsedTime">
        <xsd:sequence>
                <xsd:element name="beginElapse" type="BeginElapse"
minOccurs="0"/>
                <xsd:element name="endElapse" type="EndElapse"
minOccurs="0"/>
        </xsd:sequence>
</xsd:complexType>
<xsd:complexType name="BeginElapse">
        <xsd:choice>
                <xsd:element name="sTime" type="xsd:time"/>
                <xsd:element name="sDuration" type="xsd:duration"/>
        </xsd:choice>
</xsd:complexType>
<xsd:complexType name="EndElapse">
```

Page 10 of 27

```
        <xsd:choice>
                <xsd:element name="eTime" type="xsd:time"/>
                <xsd:element name="eDuration" type="xsd:duration"/>
        </xsd:choice>
    </xsd:complexType>
    <xsd:complexType name="PeriodicTime">
        <xsd:sequence>
                <xsd:element name="start" type="xsd:dateTime" minOccurs="0"/>
                <xsd:element name="period" type="xsd:duration"/>
                <xsd:element name="phase" type="xsd:duration" minOccurs="0"/>
                <xsd:element name="duration" type="xsd:duration"/>
                <xsd:element name="periodCount" type="xsd:duration"/>
        </xsd:sequence>
    </xsd:complexType>

    <xsd:element name="deliveryTime" type="DeliveryTime"/>
```

(Table 2)

Name	Definition
"DeliveryTime"	Delivery Time Information
"SpecificTime"	Specific time to transmit ER data
"ElapsedTime"	Elapsed time to transmit ER data
"PeriodicTime"	Periodic Time to transmit ER data
"onTime"	Time at which ER data should be transmitted
"afterOn"	After a time at which ER data should be transmitted
"beforeOn"	Before a time at which ER data should be transmitted
"beginElapse"	Reference time when elapsed time for transmitting the ER data begins. If there is no beginElapse, the reference time is Event occurrence time
"endElapse"	End time of elapsed time by which delivery of the Event Report data is ended
"sTime"	Specific time of a day on which an Event occurs, the specific time at which delivery of an Event Report data for the Event starts
"sDuration"	Duration after specific time of a day on which an Event occurs, the specific time at which delivery of an Event Report data for the Event starts

Page 11 of 27

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

"eTime"	Specific time of a day on which an Event occurs, the specific time at which delivery of an Event Report data for the Event ends
"endDuration"	Duration after specific time of a day on which an Event occurs, the specific time at which delivery of an Event Report data for the Event ends

29.   (withdrawn) The Event Report Request data as recited in claim 7, wherein based

on schema of eXtensible Markup Language (XML), syntax of the To Whom information

is defined as:

```
(Table 3)
<xsd:complexType name="Recipient">
    <xsd:sequence minOccurs="1" maxOccurs="unbounded">
        <xsd:element name="peer" type="xsd:string"/>
        <xsd:element name="reportPolicy">
            <xsd:simpleType>
                <xsd:restriction base="xsd:NMTOKEN">
                    <xsd:pattern value="required"/>
                    <xsd:pattern value="optional"/>
                </xsd:restriction>
            </xsd:simpleType>
        </xsd:element>
    </xsd:sequence>
</xsd:complexType>
<xsd:element name="recipient" type="Recipient"/>
```

(Table 4)

Name	Definition
"Recipient"	Recipient
"peer"	Peer generating Event Report
"reportPolicy"	Event Report policy. If the value is "required", the peer should transmit the ER data, and if the value is "optional", the Event Report Request message is denied and the ER data can not be transmitted.

Page 12 of 27

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

30.   (withdrawn) The Event Report Request data as recited in claim 1, wherein the

Event Report Request data includes information as:

General Element	Specific Element		
Condition Descriptor	Time		
	Event	DI Related Operation	
		Peer Related Operation	
ERR Descriptor	Description	Time Stamp	
		Life Time	
		History	
		Priority Level	
	ID		
	Access Right		
ER Descriptor	ER Data Descriptor	ER ID	
		Report Data	Peer Data
			User Data
	ERR		
Delivery Descriptor	Format		
	Encryption		
	Access Right		
	Authentication		
	Delivery Time		
	Protocol		
	Compression		
To Whom	Peer IDs		
	User IDs		

31.   (withdrawn) The Event Report Request data as recited in claim 1, wherein the

Event Report Request data includes information as:

Page 13 of 27

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

General Element	Specific Element		
Condition Descriptor	Time		
	DI Related Operation		
	Peer Related Operation		
ERR Descriptor	Description	Time Stamp	
		Life Time	
		History	
		Priority Level	
	ID		
	Access Right		
ER Descriptor	ER Data Descriptor	ER ID	
		Report Data	
		Access Right	
		Format	
	ERR		
Delivery Descriptor	To Whom	Peer IDs	
		User IDs	
	Delivery Time		
	How	Encryption	
		Authentication	
		Protocol	
		Compression	

32.   (withdrawn) An Event Report data for reporting an Event occurred in accordance

with use of a digital item, wherein the Event Report data provides information specified

in an Event Report Request data, the Event Report data comprising:

ER Descriptor describing contents and formats of the Event Report data; and

Source Descriptor describing information on a source generating the Event

Report data.

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

33.   (withdrawn) The Event Report data as recited in claim 32, further comprising:

ER Report data describing reportable information corresponding to items

requested by the Event Report Request data.

34.   (withdrawn) The Event Report data as recited in claim 33, further comprising:

Additional Action Descriptor describing additional actions related to generation,

transmission and reception of the Event Report data corresponding to the Event Report

Request data.

35.   (withdrawn) The Event Report data as recited in claim 34, wherein the ER

Descriptor includes:

identification (ID) of the Event Report data; and

description information describing attributes of the Event Report data.

36.   (withdrawn) The Event Report data as recited in claim 35, wherein the Source

Descriptor includes:

ER Peer ID describing identification (ID) of the peer who generates the Event

Report data at the first; and

Original ERR describing information on the Event Report Request data

requesting to generate the Event Report data.

37.   (withdrawn) The Event Report data as recited in claim 35, wherein the Additional

Action Descriptor includes:

ERR describing another Event Report Request data requesting an operation, e.g., an acknowledgement, forwarding or merging of the Event Report data; and

ER describing another Event Report data to be linked to the Event Report data.

38.   (withdrawn) The Event Report data as recited in claim 37, wherein the description information includes:

Format describing a format of data used for generating the Event Report data;

Encryption describing an encryption algorithm for encrypting the Event Report data;

Compression describing a compression algorithm for compressing the Event Report data;

Access Right describing an access right of the Event Report data;

Authentication describing an authentication algorithm for authenticating the Event Report data;

History describing a history of changes or modification of the Event Report data;

Priority Level describing the priority level to the Event Report data, wherein the priority level is used by the recipient to handle Event Report data; and

Time Stamp describing a time on which the Event Report data is generated.

39.   (withdrawn) The Event Report data as recited in claim 37, wherein the Event Report Report Data embeds or refers reportable information specified in the Event Report Request data.

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

40.   (withdrawn) The Event Report data as recited in claim 39, wherein the Original

ERR embeds or refers the Event Report Request data requesting to generate the Event

Report data.

41.   (withdrawn) The Event Report data as recited in claim 40, wherein the ERR

embeds or refers another Event Report Request data related to the Event Report data.

42.   (withdrawn) The Event Report data as recited in claim 41, wherein the ER

embeds or refers another Event Report data related to the Event Report data.

43.   (withdrawn) The Event Report data as recited in claim 42, wherein the ER

Descriptor further includes ER Status information describing status of the Event Report

data.

44.   (withdrawn) The Event Report data as recited in claim 32, wherein the Event

Report data includes information as:

General Element	Specific Element
ER Descriptor	ID
	Format
	Encryption
	Access Right
	Authenticate
	Compression
	History
	Priority Level
	Time Stamp
Source Descriptor	ER Peer ID
	Original ERR
ER Report Data	
Additional Action Descriptor	ERR

Page 17 of 27

	ER

45-105.   (canceled)

106.   (new) An apparatus for requesting a report on an event for an Event
Reporting on the event that occurs in accordance with use of a digital item, the
apparatus comprising:

an Event Report Request (ERR) generation means for generating an ERR
data in response to at least one of a user's request and a received ERR data, the
user's request and the received ERR data requesting an Event Report (ER) data
for the Event Reporting;

an ERR transmission means for transmitting the ERR data generated in the
ERR generation means;

an ERR receiving means for receiving the ERR data; and

an ERR analyzing means for analyzing the ERR data received in the ERR
receiving means,

wherein the ERR data includes:

ERR descriptor information describing characteristics of the ERR data;

first ER descriptor information describing characteristics of ER data
generated based on the ERR data; and

condition descriptor information describing conditions of occurrence of
the event,

wherein the ER data includes:

second ER descriptor information describing characteristics of the ER

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

data;

Original ERR information describing ERR data requesting to generate the ER data; and

payload information including reporting information of the ER data,

wherein the ER data further includes ERR information describing information on another ERR data included in the ER data.

107.   (new) The apparatus as recited in claim 106, wherein the ERR descriptor information includes life time information describing a life time of the ERR data.

108.   (new) The apparatus as recited in claim 106, wherein the ERR descriptor information includes history information describing a history of creation or modification of the ERR data.

109.   (new) The apparatus as recited in claim 106, wherein the ERR descriptor information includes priority level information describing priority level for processing the ERR data.

110.   (new) The apparatus as recited in claim 106, wherein the first ER descriptor information includes identification information of the ER data.

111.   (new) The apparatus as recited in claim 106, wherein the first ER descriptor information includes ER access control information describing

Application Serial No. 10/580,290   PATENT
Reply to non-final office action of February 11, 2011   Docket: CU-4843

information on a peer or a user that can access to the ER data.

112.   (new) The apparatus as recited in claim 106, wherein the first ER

descriptor information includes ER format information describing information on

a format of the ER data.

113.   (new) The apparatus as recited in claim 106, wherein the first ER

descriptor information includes ERR information describing information on

another ERR data included in the ER data.

114.   (new) The apparatus as recited in claim 106, wherein the first ER

descriptor information includes at least one of identification information of a peer

and identification information of a user, the peer and the user generating the ER

data.

115.   (new) The apparatus as recited in claim 106, wherein the first ER

descriptor information includes delivery parameter information describing

information on delivery of the ER data.

116.   (new) The apparatus as recited in claim 106, wherein the Condition

descriptor information includes time condition information describing occurrence

time of the event.

117.   (new) The apparatus as recited in claim 106, wherein the Condition descriptor information includes condition information other than time condition information describing occurrence time of the event.

118.   (new) The apparatus as recited in claim 106, wherein the second ER descriptor information includes source information describing information on generation of the ER data.

119.   (new) An apparatus for processing a report on an event for an Event Reporting on the event that occurs in accordance with use of a digital item, the apparatus comprising:

   a monitoring means for monitoring whether or not the event occurs;

   an ER generation means for generating an Event Report(ER) data for an event report corresponding to an Event Report Request(ERR) data requesting the report on the event; and

   an ER transmission means for transmitting the ER data generated in the ER generation means,

   wherein the ERR data includes:

   ERR descriptor information describing characteristics of the ERR data;

   first ER descriptor information describing characteristics of ER data generated based on the ERR data; and

   condition descriptor information describing conditions of occurrence of an event,

wherein the ER data includes:

second ER descriptor information describing characteristics of the ER data;

Original ERR information describing ERR data requesting to generate the ER data; and

payload information including reporting information of the ER data,

wherein the ER data further includes ERR information describing information on another ERR data included in the ER data.

120.   (new) The apparatus as recited in claim 119, wherein the ERR descriptor information includes life time information describing a life time of the ERR data.

121.   (new) The apparatus as recited in claim 119, wherein the ERR descriptor information includes history information describing a history of creation or modification of the ERR data.

122.   (new) The apparatus as recited in claim 119, wherein the ERR descriptor information includes priority level information describing priority level for processing the ERR data.

123.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor information includes identification information of the ER data.

124.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor

information includes ER access control information describing information on a

peer or a user that can access to the ER data.

125.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor

information includes ER format information describing information on a format of

the ER data.

126.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor

information includes ERR information describing information on another ERR

data included in the ER data.

127.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor

information includes at least one of identification information of a peer and

identification information of a user, the peer and the user generating the ER data.

128.   (new) The apparatus as recited in claim 119, wherein the first ER descriptor

information includes delivery parameter information describing Information on

delivery of the ER data.

129.   (new) The apparatus as recited in claim 119, wherein the Condition

descriptor information includes time condition information describing occurrence

time of the event.

130. (new) The apparatus as recited in claim 119, wherein the Condition

descriptor information includes condition information other than time condition

information describing occurrence time of the event.

131. (new) The apparatus as recited in claim 119, wherein the second ER

descriptor information includes source information describing information on

generation of the ER data.